

Work Order ID 67936

Tuesday, April 05, 2011 10:02:13 AM



Page 1

Item ID: D350-591-122

Accept



Setup Start



Revision ID:

Item Name: Heli-Access-Step, RH

Stop



Start Date: 4/4/2011 Start Qty: 4.00



Cust Item ID:

Required Date: 4/8/2011 Req'd Qty: 5.00

Customer:

Reference:

Approvals:

Process Plan:

Date: 11-04-5

Tooling:

Date:

Run Start



QC:

Date:

SPC (Y/N):

Date:

Stop



Sequence ID/
Work Center ID

Operation
Description

Set Up/
Run Hours

Tool ID

Tool #

Plan
Code

Accept
Qty

Reject
Qty

Reject
Number

Insp.
Stamp

Draw Nbr

Revision Nbr

D2351

E

100

0.00



DOCUMENT CONTROL

DC

Memo

0.00

Document Control

Photocopy bluefile and type labels as per PPP D350-591-122 CHG005

Sublog

11-6-8

110

0.00



Large Fab

Large Fab

Memo

0.00

Large Fab

1-Cut D2244-116 extrusion to 55.32" long as per Dwg D2351 using cutting table setup DT8185-G
2-Drill extrusion per Dwg D2351 using Jig DT8230 for rivets.

11-05-26 4

130

0.00



BENDING MACHINE - SKIDTUBES

CNC Bend 1

Memo

0.00

CNC Delta 100 Bender

Bend as per dwg D2351-042 using cnc bender and Folio FT 012. Use bend prog. D2351-042.

11-5-26

Dart Aerospace Ltd

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Work Order ID 67936

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Item ID: D350-591-122

Accept



Setup Start



Revision ID:

Stop



Item Name: Heli-Access-Step, RH

Start Date: 4/4/2011 Start Qty: 3.00



Cust Item ID:

Required Date: 4/8/2011 Req'd Qty: 3.00



Customer:

Reference:

Run Start



Approvals: Process Plan: _____ Date: _____ Tooling: _____ Date: _____

QC: _____ Date: _____ SPC (Y/N): _____ Date: _____

Stop

Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run Hours

Tool ID

Tool #

Plan
CodeAccept
QtyReject
QtyReject
NumberInsp.
Stamp

140



QC

Quality Control

QC5- Inspect part completeness to step on W/O

0.00

Memo

0.00

8 4/05/30

24
RH

150



Large Fab

Large Fab

Large Fab

Memo

1-Bevel Fwd and Aft end for welding
2-Weld Aft End Bracket per QSI 004 & Dwg D2351 using Welding Jig DT8033
A/RAluminum Rod 1115928
3-Do not Grind Flush

0.00

0.00

11.05.31

4

Ø

160



QC

Quality Control

QC9- Inspect visual per QSI004- Fusion Welds

0.00

Memo

0.00

4 Ø BEI/06/01

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
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Tuesday, April 05, 2011 10:02:13 AM

Item ID: D350-591-122

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Setup Start



Revision ID:

Stop



Item Name: Heli-Access-Step, RH

Start Date: 4/4/2011 Start Qty: 3.00



Cust Item ID:

Required Date: 4/8/2011 Req'd Qty: 3.00



Customer:

Reference:

Run Start



Approvals: Process Plan: _____ Date: _____ Tooling: _____ Date: _____

Stop



QC: _____ Date: _____ SPC (Y/N): _____ Date: _____

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
--------------------------------	--------------------------	----------------------	---------	--------	--------------	---------------	---------------	------------------	----------------

170

QC5- Inspect part completeness to step on W/O

0.00



QC

Memo

0.00

Quality Control

8 w/06.04

4

RH

180

Chemical Conversion Coat per QSI005 4.1

0.00



HandFinish

Memo

0.00

Hand Finishing

4x 0 m/14/06/02
RH

190

QC3- Inspect Part Finish

0.00



QC

Memo

0.00

Quality Control

11.06.04

4

0

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
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Item ID: D350-591-122

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Setup Start



Revision ID:

Stop



Item Name: Heli-Access-Step, RH

Start Date: 4/4/2011 Start Qty: 3.00



Cust Item ID:

Required Date: 4/8/2011 Req'd Qty: 3.00



Customer:

Reference:

Run Start



Approvals: Process Plan: _____ Date: _____ Tooling: _____ Date: _____

QC: _____ Date: _____ SPC (Y/N): _____ Date: _____

Stop



Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
200		0.00							
	Large Fab								
Large Fab	Memo	0.00							
Large Fab	1-Rivet Leg Assembly as per Dwg D2351								
210		0.00							
	QC5- Inspect part completeness to step on W/O								
QC	Memo	0.00							
Quality Control									
220		0.00							
	Large Fab								
Large Fab	Memo	0.00							
Large Fab	1-Weld Fwd End Plate per QSI 004 & Dwg D2351								
	A/RAluminum Rod m114703								
	2-Grind end plate flush.								

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
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Item ID: D350-591-122

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Setup Start



Revision ID:

Stop



Item Name: Heli-Access-Step, RH

Start Date: 4/4/2011 Start Qty: 3.00



Cust Item ID:

Required Date: 4/8/2011 Req'd Qty: 3.00



Customer:

Reference:

Run Start



Approvals: Process Plan: _____ Date: _____ Tooling: _____ Date: _____

Stop



QC: _____ Date: _____ SPC (Y/N): _____ Date: _____

Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run Hours

Tool ID

Tool #

Plan
CodeAccept
QtyReject
QtyReject
NumberInsp.
Stamp

225

QC5- Inspect part completeness to step on W/O

0.00



QC

Memo

0.00

Quality Control

230

QC9- Inspect visual per QSI004- Fusion Welds

0.00



QC

Memo

0.00

Quality Control

250

Chemical Conversion Coat per QSI005 4.1

0.00



HandFinish

Memo

0.00

Hand Finishing

S u l o g / o g

S u l o g / o g

(x4)

RM

PH →

4x Ø M-L u l o g / o g
RH

W/O: 67936		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector
		Perm. change					
11/6/16	# 30	change step to QCI	E	11-06-13			8 11/6/16

Part No: D350-591-122 PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
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Setup Start



Revision ID:

Stop



Item Name: Heli-Access-Step, RH

Start Date: 4/4/2011 Start Qty: 3.00



Cust Item ID:

Required Date: 4/8/2011 Req'd Qty: 3.00



Customer:

Reference:

Run Start



Approvals: Process Plan: _____ Date: _____ Tooling: _____ Date: _____

QC: _____ Date: _____ SPC (Y/N): _____ Date: _____

Stop

Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run Hours

Tool ID

Tool #

Plan
CodeAccept
QtyReject
QtyReject
NumberInsp.
Stamp

260

White Gloss(Ref:4.3.5.1) per QSI005 4.3-Alum

0.00



Powdercoat

Memo

START TIME:

11-10

OVEN TEMPERATURE:

Powder Coating

FINISH TIME:

11-40

4X ~~Ø~~ M 11/06/07
RH

270

Wing Walk as per dwg QSI005 4.4 Batch

0.00



HandFinish

Memo

117315

0.00

Hand Finishing

4 RH ~~Ø~~ BK 11-6-7

280

QC3- Inspect Part Finish

0.00



QC

Memo

0.00

Quality Control

4 RH ~~Ø~~ M 11/06/07

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
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NOTE: Date & initial all entries

Work Order ID 67936

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Tuesday, April 05, 2011 10:02:13 AM

Item ID: D350-591-122

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Setup Start



Revision ID:

Stop



Item Name: Heli-Access-Step, RH

Start Date: 4/4/2011 Start Qty: 3.00



Cust Item ID:

Required Date: 4/8/2011 Req'd Qty: 3.00



Customer:

Reference:

Run Start



Approvals: Process Plan: _____ Date: _____ Tooling: _____ Date: _____

Stop



QC: _____ Date: _____ SPC (Y/N): _____ Date: _____

Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run Hours

Tool ID

Tool #

Plan
CodeAccept
QtyReject
QtyReject
NumberInsp.
Stamp

290

Pick Kit

0.00



Packaging

Memo

0.00

Packaging

11/6/8 PDS

300

QC4- 100% Inspect kits for completeness

0.00



QC

Memo

0.00

Quality Control

Jubok/og

RH

310

Packaging

0.00



Packaging

Memo

0.00

Packaging

Identify and pack for shipping as per PPP D350-591

122□Location: 80 □PPP Rev: E

Pup/3 G

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

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Work Order ID 67936

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Item ID: D350-591-122

Accept



Setup Start



Revision ID:

Stop



Item Name: Heli-Access-Step, RH

Start Date: 4/4/2011 Start Qty: 3.00



Cust Item ID:

Required Date: 4/8/2011 Req'd Qty: 3.00



Customer:

Reference:

Approvals:

Process Plan: _____

Date: _____

Tooling: _____

Date: _____

Run Start



QC: _____

Date: _____

SPC (Y/N): _____

Date: _____

Stop

Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run Hours

Tool ID

Tool #

Plan
CodeAccept
QtyReject
QtyReject
NumberInsp.
Stamp

320

QC21- Final Inspection - Work Order Release

0.00



QC

Memo

0.00

Quality Control

11/6/9 [Signature]
MF
11-06-09

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

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NOTE: Date & initial all entries

Picklist Print

Tuesday, April 05, 2011 10:02:19 AM

Page 1

Work Order ID: 67936

Parent Item: D350-591-122

Parent Item Name: Heli-Access-Step, RH



Start Date: 4/4/2011

Required Date: 4/8/2011

Start Qty: 3.00

Required Qty: 3.00

Comments: IPP Rev:E02.10.21 Re-format; Incorporated D2351-041 IPP KJ/RF

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
---------------------------------	------------------------	---------------	-------------	---------------------	------------------	-----------------	--------------------	----------------	-------------	--------------	---------------	----------------	--------

D2244-116		Manufactured	No			110	Each	163.0000	0.5	1.5			
<div style="display: flex; justify-content: space-between;"> <div> <p>Step Extrusion</p> </div> <div> <p><u>Location</u></p> <p>HALL 97</p> <p>60307 97</p> <p>WA 66</p> <p>57850 19</p> <p>60307 47</p> </div> <div> <p><u>Loc Qty</u></p> <p>97</p> <p>97</p> <p>66</p> <p>19</p> <p>47</p> </div> <div> <p><u>Loc Code</u></p> <p></p> <p></p> <p></p> <p></p> <p></p> </div> </div>													

D2850-2		Manufactured	No			150	Each	6.0000	1	3			
<div style="display: flex; justify-content: space-between;"> <div> <p>End Cap</p> </div> <div> <p><u>Location</u></p> <p>ST016 6</p> <p>47114 6</p> </div> <div> <p><u>Loc Qty</u></p> <p>6</p> <p>6</p> </div> <div> <p><u>Loc Code</u></p> <p></p> <p></p> </div> </div>													

D2582		Manufactured	No			200	Each	9.0000	1	3			
<div style="display: flex; justify-content: space-between;"> <div> <p>Step Leg Assembly</p> </div> <div> <p><u>Location</u></p> <p>WA014 9</p> <p>62053 3</p> <p>67214 6</p> </div> <div> <p><u>Loc Qty</u></p> <p>9</p> <p>3</p> <p>6</p> </div> <div> <p><u>Loc Code</u></p> <p></p> <p></p> <p></p> </div> </div>													

B68965 (4)

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action- Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Picklist Print

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Page 2

Work Order ID: 67936

Parent Item: D350-591-122

Parent Item Name: Heli-Access-Step, RH

Start Date: 4/4/2011

Required Date: 4/8/2011

Start Qty: 3.00

Required Qty: 3.00

MS20600-AD4W3

Purchased

No

200

Each

931.0000

16

48



Cherry Rivets

Location

Loc Qty

Loc Code

ST321

494

111636

494

WA018

437

107939

437

D2673-34

Manufactured

No

220

Each

111.0000

1

3



End Plate

Location

Loc Qty

Loc Code

WA015

111

59690

111

AN3-37A

Purchased

No

290

Each

263.0000

2

6



Bolt

Location

Loc Qty

Loc Code

ST353

263

105425

127

111668

136

AN4-13A

Purchased

No

290

Each

296.0000

3

9



Bolt

Location

Loc Qty

Loc Code

ST357

296

117094

296

AN960JD10

NAS1149D0363J

Purchased

No

290

Each

0.0000

4

12



Washer

Tuesday, April 05, 2011 10:02:19 AM

Shop Packet Print

Page 2

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
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Page 3

Work Order ID: 67936

Parent Item: D350-591-122

Parent Item Name: Heli-Access-Step, RH

Start Date: 4/4/2011

Required Date: 4/8/2011

Start Qty: 3.00

Required Qty: 3.00

AN960JD416 NAS1149D0463J Purchased No

290 Each

0.0000

6 18

Washer

D2230-1

Manufactured No

290 Each

2.0000

1 3

Lug

Location

Loc Qty

Loc Code

ST476

2

65270

2

D2230-3

Manufactured No

290 Each

13.0000

1 3

Lug

Location

Loc Qty

Loc Code

Return 2010

4

62927

2

63544

2

ST470

9

66936

9

D2856-400

Manufactured No

290 f

2.5200

0.6 1.8

Abraison Strip

Location

Loc Qty

Loc Code

ST409

2.52

63735

2.52

cut (1) at 7.20"

Tuesday, April 05, 2011 10:02:20 AM

Shop Packet Print

Page 3

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

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Page 4

Work Order ID: 67936

Parent Item: D350-591-122

Parent Item Name: Heli-Access-Step, RH

Start Date: 4/4/2011

Required Date: 4/8/2011

Start Qty: 3.00

Required Qty: 3.00

MS21042L3

Purchased

No

290

Each

2,051.000

2



Nut



6
SP

Location

Loc Qty

Loc Code

ST300

2051

116391

451

116540

800

116549

800

MS21042L4

Purchased

No

290

Each

3,160.000

3



Nut



9
SP

Location

Loc Qty

Loc Code

ST300

3160

116188

1160

116823

2000

D2732-030

Manufactured

No

290

Each

2.0000

2



Rubber Cushion



6
B64223 SP

Location

Loc Qty

Loc Code

ST410

2

65395

2

cut (2) at 3.00"

AN4-16A

Purchased

No

290

Each

88.0000

2



Bolt



6
11/6/8 SP

Location

Loc Qty

Loc Code

ST358

88

116400

88

8

Tuesday, April 05, 2011 10:02:20 AM

Shop Packet Print

Page 4

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

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DESIGN KE	DRAWN BY PH	DART AEROSPACE LTD. HAWKESBURY, ONTARIO, CANADA	
CHECKED H	APPROVED H	DRAWING NO. D2351	REV. E SHEET 1 OF 2
DATE 05.11.14		TITLE HIGH FLOAT STEP ASSEMBLY	SCALE NTS
A	95.02.15	NEW ISSUE	
B	97.05.22	END CAPS CHANGED	
C	97.07.23	ADDED BUSHING AND FACING INFO	
D	98.12.17	CHANGED TO BEND, D2850 REPLACES D2357 & D2358, INCORP. DEO 9084	
E	05.11.14	UPDATE FINISHING NOTE	

D2351 HIGH FLOAT STEP ASSEMBLY PARTS LIST

Part No.	Description	QTY -041	QTY -042
D2351-041	High Float Step Assembly (LH)	X	
D2351-042	High Float Step Assembly (RH)		X
D2244-55.4	STEP EXTRUSION*	1	1
D2582	STEP LEG ASSEMBLY	1	1
D2673-34	STEP END PLATE	1	1
D2850-1	END BRACKET	1	
D2850-2	END BRACKET		1
MS20600AD4W3	RIVETS	16	16

*cut per drawing

SHOP COPY
RETURN TO
ENGINEERING
UNCONTROLLED COPY
SUBJECT TO AMENDMENT
WITHOUT NOTICE
WORK ORDER
NO. 67936

PH 11-04-5

RELEASED
05.11.28 *H*

PH
ECN 1105

UNDER REVIEW

07.11.29 *H*

PER NO. 263

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W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

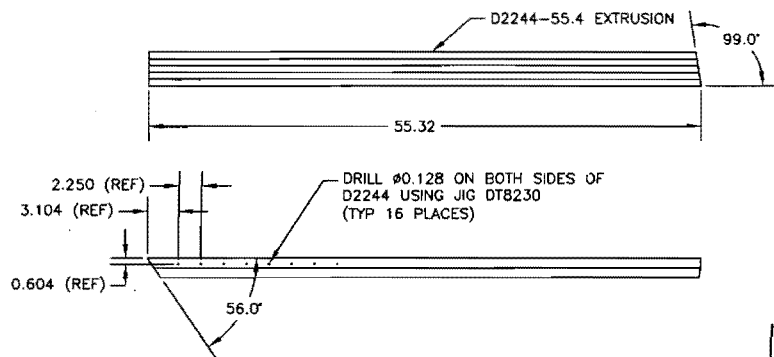
Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

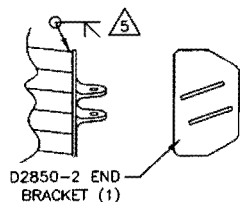
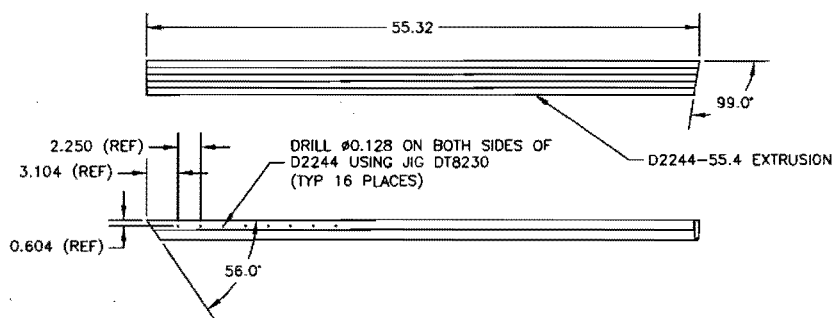
NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

• NOTE: Date & initial all entries

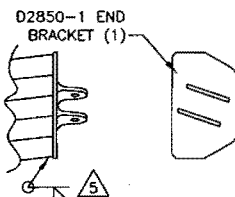
D2351-2 CUTTING/DRILLING DETAIL
RIGHT STEP



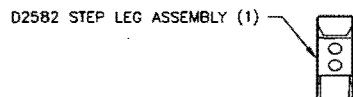
D2351-1 CUTTING/DRILLING DETAIL
LEFT STEP



DETAIL A
SCALE: 1:4

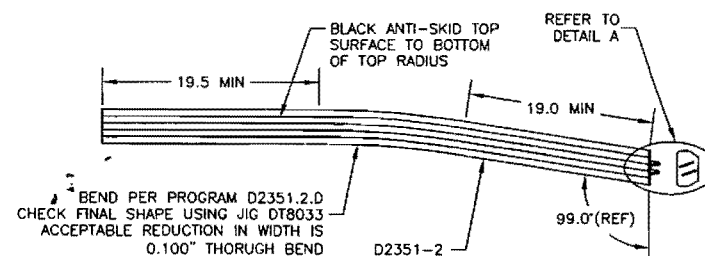


DETAIL B
SCALE: 1:4

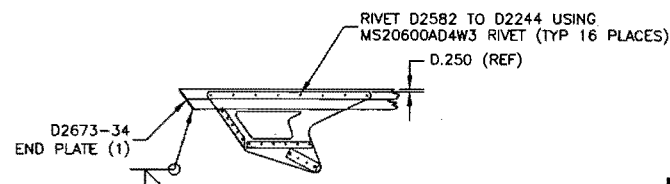
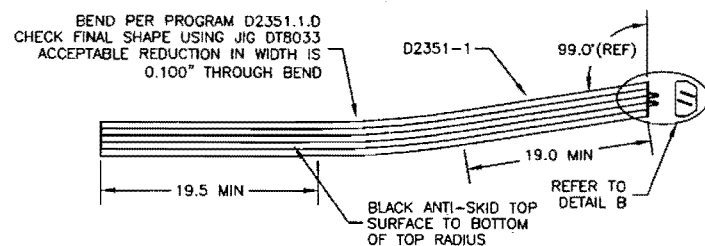


- GENERAL NOTES
- 1) WELD PER DART QSI 004
 - 2) FINISH: CHEMICAL CONVERSION COAT PER DART QSI 005 4.1
POWDER COAT GLOSS WHITE (4.3.5.1) PER DART QSI 005 4.3
BLACK ANTI-SKID PAINT PER DART QSI 005 4.4
 - 3) ALL DIMENSIONS ARE IN INCHES
 - 4) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- CHAMFER D2244 EXTRUSION 0.075"x45° BEFORE WELDING D2850-1 OR D2850-2 IN PLACE. DO NOT GRIND FLUSH.

D2351-042 BENDING/ASSEMBLY DETAIL
RIGHT STEP



D2351-041 BENDING/ASSEMBLY DETAIL
LEFT STEP



RELEASED
05.11.28

UNDER REVIEW

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DESIGN KE	DRAWN BY PH	DART	DART AEROSPACE LTD. HARRISBURG, ONTARIO, CANADA
CHECKED #	APPROVED #	DRAWING NO. D2351	REV. E
DATE 05.11.14		TITLE HIGH FLOAT STEP ASSEMBLY	SHEET 2 OF 2
			SCALE 1:12

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

5. PARTS LIST

Qty -111A	Qty -113	Qty -115	Qty -117A	Qty -119	Qty -133	Part Number	Description
X						D350-591-111A	<i>Heli-Access-Step</i> ™, Long Step – High Skid
	X					D350-591-113	<i>Heli-Access-Step</i> ™, Short Step – High Skid
		X				D350-591-115	<i>Heli-Access-Step</i> ™, Short Step – Low Skid
			X			D350-591-117A	<i>Heli-Access-Step</i> ™, Pre-Flight Step
				X		D350-591-119	<i>Heli-Access-Step</i> ™, Long Step – Low Skid
					X	D350-591-133	<i>Heli-Access-Step</i> ™, Aft Maintenance Step
	1					D2310	STEP ASSEMBLY (HIGH-SHORT)
1						D2311	STEP ASSEMBLY (HIGH-LONG)
		1				D2354	STEP ASSEMBLY (LOW-SHORT)
				1		D2355	STEP ASSEMBLY (LOW-LONG)
					1	D2946-041	STEP ASSEMBLY (MAINTENANCE)
4	2	2	2	2		D2171	CLAMP
4	2	2	2	2		D2182B035	CUSHION
					4	D2230-1	MOUNTING LUG
					4	D2230-3	MOUNTING LUG
8	4	4	4	4		D2274	RADIUS BLOCK
			1			D2362-041	SUPPORT BRACKET
2	1			1		D2362-3	SUPPORT BRACKET
		1				D2362-5	SUPPORT BRACKET
2	1	1	1	1	2	D2856-400-720	ABRASION STRIP
					1	D2945	MOUNTING PLATE
2	2	2		2		AN3-37A	BOLT
					2	AN4-7A	BOLT
					4	AN4-11A	BOLT
					8	AN4-14A	BOLT
		4				AN4-16A	BOLT
8	4			4		AN4-20A	BOLT
1	1	1	4	1		AN4-22A	BOLT
4	4	4		4		AN960JD10	WASHER
10	6	2	4	6	14	AN960JD416	WASHER
		4				AN960JD416L	WASHER
2	2	2		2		MS21042L3	NUT
9	5	5	4	5	14	MS21042L4	NUT

Qty -121	Qty. -122	Qty -123	Qty -124	Part Number	Description
X				D350-591-121	<i>Heli-Access-Step</i> ™, Short Step – High Skid, LH
	X			D350-591-122	<i>Heli-Access-Step</i> ™, Short Step – High Skid, RH
		X		D350-591-123	<i>Heli-Access-Step</i> ™, Short Step – Low Skid, LH
			X	D350-591-124	<i>Heli-Access-Step</i> ™, Short Step – Low Skid, RH
1				D2351-041	STEP ASSEMBLY (HIGH-SHORT, LH)
	1			D2351-042	STEP ASSEMBLY (HIGH-SHORT, RH)
		1		D2356-041	STEP ASSEMBLY (LOW-SHORT, LH)
			1	D2356-042	STEP ASSEMBLY (LOW-SHORT, RH)
1	1	1	1	D2230-1	MOUNTING LUG
1	1	1	1	D2230-3	MOUNTING LUG
1	1	1	1	D2856-400-720	ABRASION STRIP
2	2	2	2	AN3-37A	BOLT
3	3	3	3	AN4-13A	BOLT
4	4	4	4	AN960JD10	WASHER
6	6	6	6	AN960JD416	WASHER
2	2	2	2	MS21042L3	NUT
3	3	3	3	MS21042L4	NUT

REFERENCE ONLY

DART SERVICE INSTRUCTION

TO AMEND INSTALLATION INSTRUCTIONS D350-591 REV. G OR EARLIER
AND
INSTRUCTIONS OF CONTINUED AIRWORTHINESS ICA-D350-591 REV. 2 OR EARLIER

REF CANADIAN STC: SH92-6
REF FAA STC: SH967NE

For D350-591-121/-122/-123/-124/-133 steps, customers have the option of installing D2732-030 cushions under the D2230-1/-3 clamps to accommodate varying crosstube diameters and to improve fit. It is also acceptable to use longer or shorter AN4 bolts, and/or extra AN960JD416 washers under the nut to ensure 1.5 to 4 threads in safety. See Figure 1 on sheet 2 of this service instruction for reference.

For D350-591-121/-122 steps at CHG 005, D350-591-123/-124 steps at CHG 004, and D350-591-133 steps at CHG 003, the parts list of D350-591 Rev. G and ICA-D350-591 Rev. 2 is amended as follows:

ADD:

Qty -121	Qty -122	Qty -123	Qty -124	Qty -133	Part Number	Description
X					D350-591-121	<i>Heli-Access-Step</i> ™, Short Step – High Skid, LH
	X				D350-591-122	<i>Heli-Access-Step</i> ™, Short Step – High Skid, RH
		X			D350-591-123	<i>Heli-Access-Step</i> ™, Short Step – Low Skid, LH
			X		D350-591-124	<i>Heli-Access-Step</i> ™, Short Step – Low Skid, RH
				X	D350-591-133	<i>Heli-Access-Step</i> ™, Aft Maintenance Step
2	2	2	2	8	D2732-030	CUSHION
2	2	2	2	8	AN4-16A	BOLT

The DSI-9459-011 kit is available for customers with earlier model D350-591-121/-122/-123/-124 steps. Longer AN4 bolts are provided to fasten the clamps. The DSI-9459-013 kit is available for customers with earlier model D350-591-133 steps.

Qty -011	Qty -013	Part Number	Description
X		DSI-9459-011	Rubber Cushion Kit (for -121/-122/-123/-124 steps)
	X	DSI-9459-013	Rubber Cushion Kit (for -133 steps)
2	8	D2732-030	CUSHION
2	8	AN4-16A	BOLT

CANADA DEPARTMENT OF TRANSPORT AIRCRAFT CERTIFICATION BRANCH DAO # 01-O-01	
APPROVED	
BY:	<i>[Signature]</i>
D. SHEPHERD (DE # 02)	
DATE:	09.06.24
CERT. NO.:	SH92-6
ISSUE NO.:	11

B	AN4-16A WAS -17A FOR -013/-133 KIT	CP	09.06.24
A	NEW ISSUE	CP	09.04.17
REV.	DESCRIPTION		BY DATE
DESIGN	<i>GP</i>	DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA	
DRAWN	<i>GP</i>		
CHECKED	<i>PL</i>	DRAWING NO.	REV. B
MFG. APPR.	<i>N/A</i>	DSI 9459	SHEET 1 OF 2
APPROVED	<i>[Signature]</i>	TITLE	SCALE
DE APPR.	<i>[Signature]</i>	OPTIONAL CLAMP MODIFICATIONS	NTS
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